

APPENDIX E

Beck's Lake Site, St. Joseph County, South Bend, IN
EPA ID: IND980904379
Soil Sample Location Map



Source: USGS National Wetlands Inventory
Map Date: 10/2000
Scale: 1 inch = 100 feet



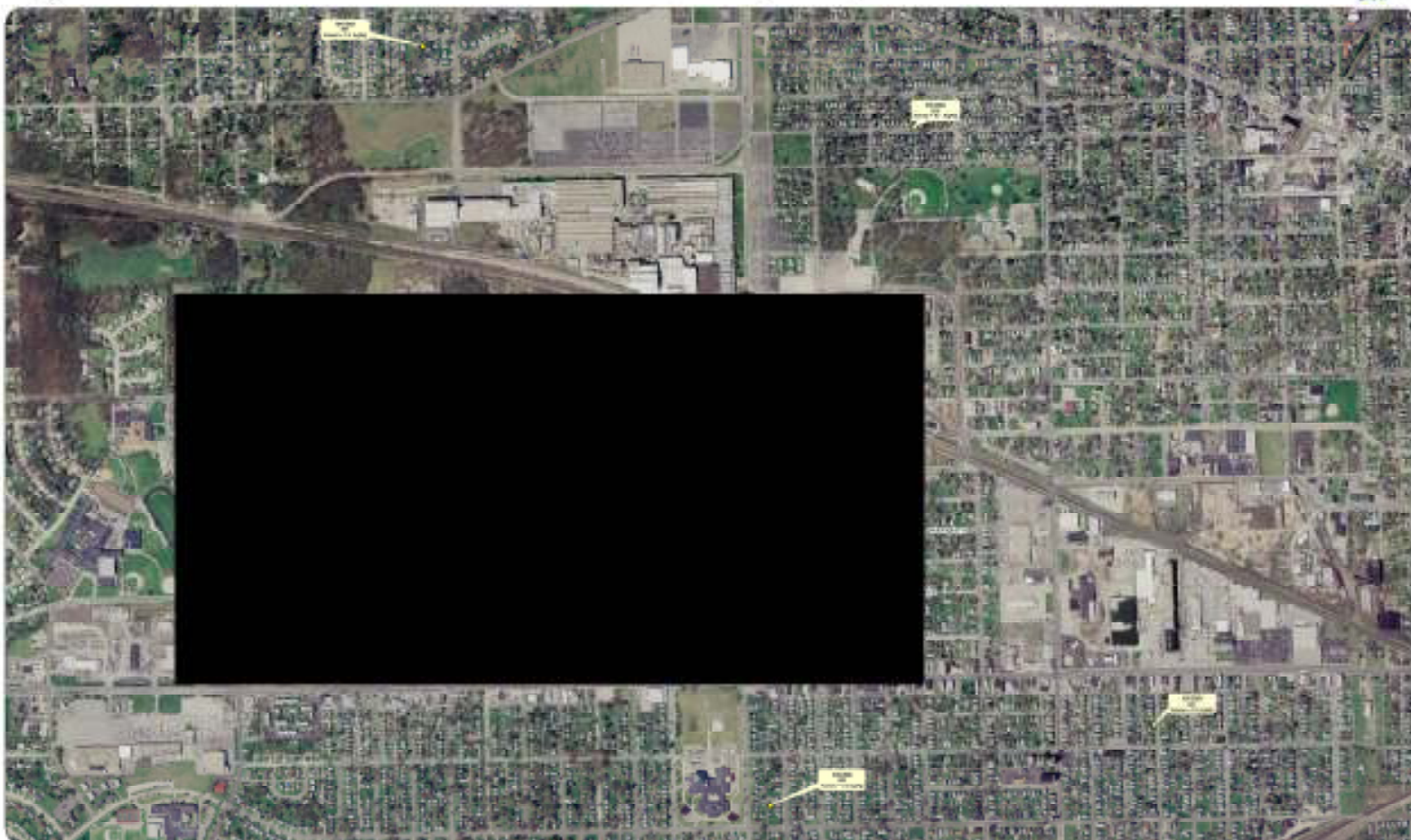
• Soil Sample Location

Legend
Wetlands
Water
Land
Roads
Buildings
Other

APPENDIX F



Arsenic Concentrations for Beck's Lake
EPA ID Number IND980904379
South Bend, St. Joseph County



Beck's Lake

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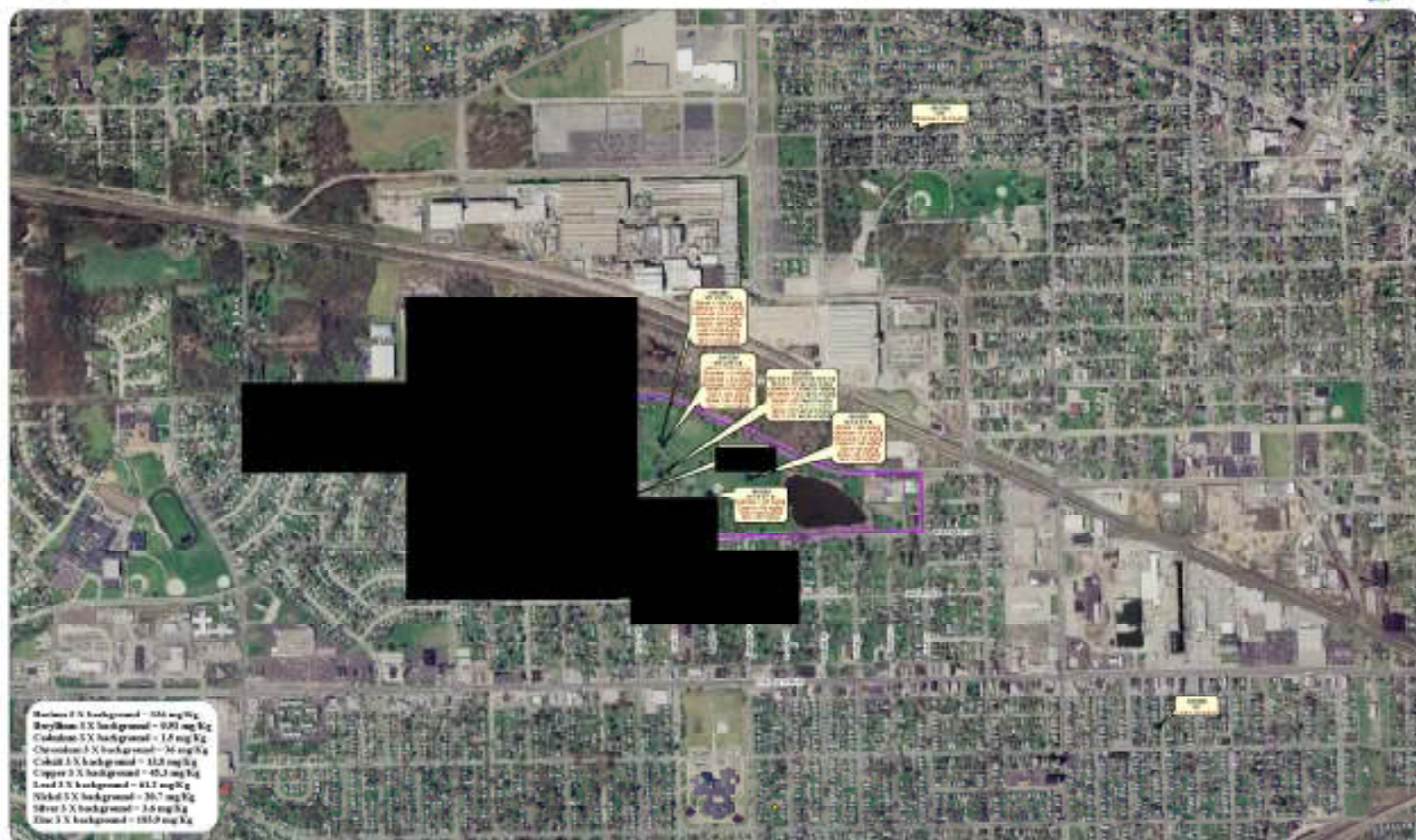


APPENDIX G



Heavy Metals Concentrations for Beck's Lake

EPA ID Number IND980904379
South Bend, St. Joseph County



Barium 2 X background = 104 mg/kg
Beryllium 2 X background = 0.01 mg/kg
Cadmium 2 X background = 1.0 mg/kg
Chromium 2 X background = 16 mg/kg
Cobalt 2 X background = 11.0 mg/kg
Copper 2 X background = 45.0 mg/kg
Lead 2 X background = 61.0 mg/kg
Nickel 2 X background = 36.7 mg/kg
Silver 2 X background = 3.0 mg/kg
Zinc 2 X background = 183.0 mg/kg

Beck's Lake 2000-2005 Data

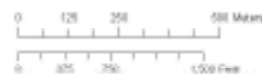
Heavy Metals - 2 X Background

Heavy Metals - 1 X Background

Beck's Lake 2000-2005 Data

Heavy Metals - 2 X Background

Beck's Lake 2000-2005 Data
Heavy Metals - 1 X Background



APPENDIX H



13-38

BFS-3- 9



6-14-51

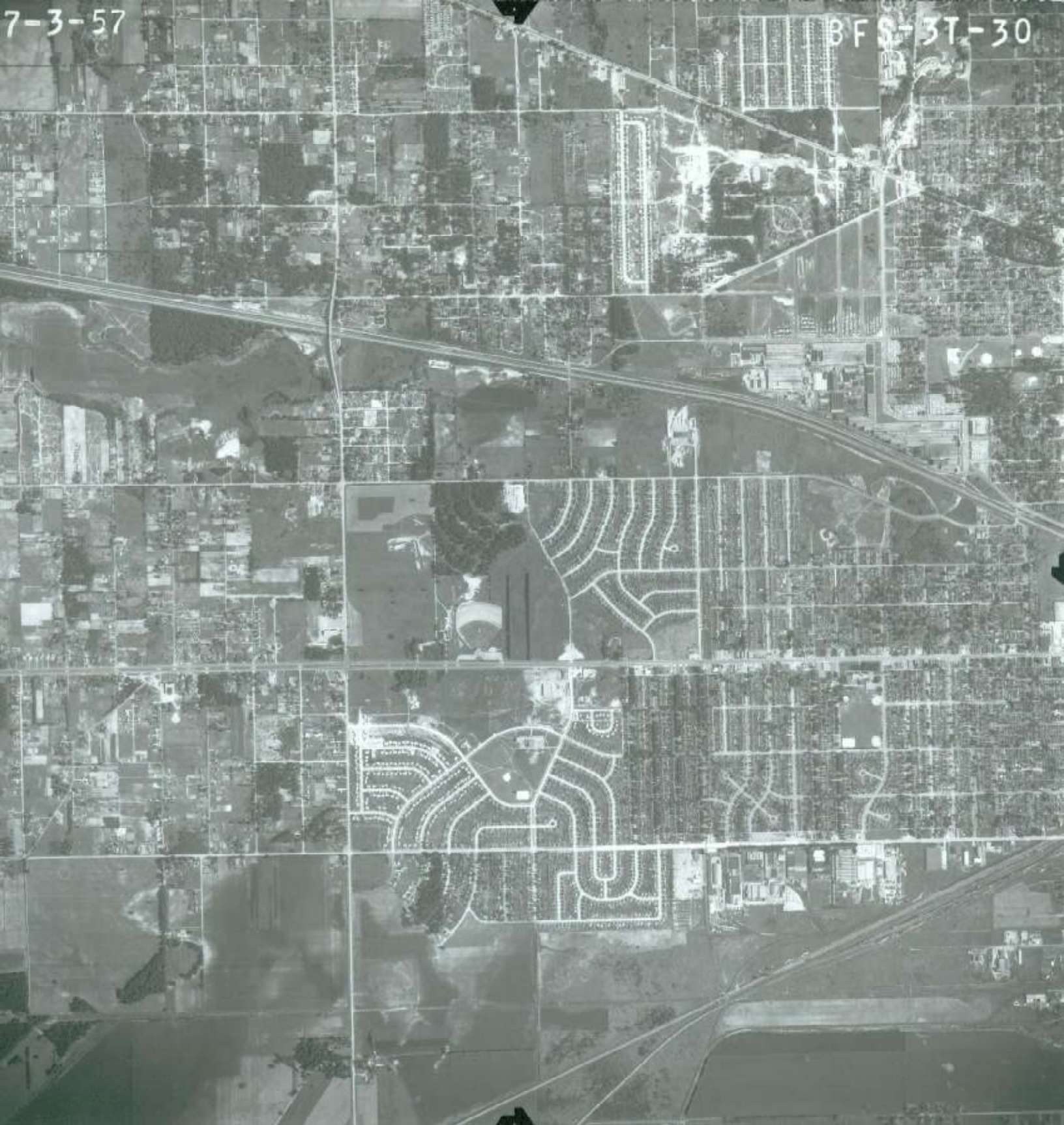
BFS-2H-126





7-3-57

BFS-3T-30





7-20-65

BFF-2FF-103





7-13-73

A 46

18141

173

89





APPENDIX I

ST. JOSEPH COUNTY HEALTH DEPARTMENT

COUNTY-CITY BUILDING - 6TH FLOOR

PHONE (219) 284-9750

SOUTH BEND, INDIANA 46601

JAMES E. BOWES, M.D., M.P.H.
HEALTH OFFICER

March 28, 1984

Mr. James R. Seitz
Superintendent
Department of Public Works
City of South Bend
301 South St. Louis
South Bend, Indiana 46617

Dear Mr. Seitz:

Subject: Property Described as 12.6 Acres in Section 10-37-2E
(LaSalle Park), St. Joseph County, Indiana

As you know, Section 103(c) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (the Act) requires owners or operators of hazardous waste facilities, as defined in the Act, or transporters of hazardous substances to such facilities, to notify the Environmental Protection Agency (EPA) of the existence of facilities and the types of hazardous substances that were treated, stored or disposed of at the facilities.

The Bendix Corporation in South Bend, Indiana ("Bendix") has advised this Office that on the basis of information recently discovered by Bendix at some time during the past forty (40) years Bendix, together with numerous other companies and individuals, disposed of certain hazardous waste materials at the landfill site known as the Beck's Lake Landfill. Bendix is required under the Act to notify the EPA of the fact that the landfill was utilized as a disposal site for such hazardous substances even though the disposals were not unlawful when made and were made with the specific permission of the owner or operator at that time. Since Bendix is notifying the EPA, Bendix and this Office feel that you should be advised that the notification is being made.

To the extent that any assessment of the present conditions of the site will be necessary, Bendix has employed a nationally known environmental consultant, ERM-North Central, Inc. of Palatine, Illinois, to assist this Office in this effort.

We ask you to notify this Office of the names of any company or person other than Bendix who disposed of wastes at the above-identified site.

If you have any questions regarding this notice, please call this Office at 284-9721.

Very truly yours,

Paul E. Trost

Paul E. Trost
Pollution Control Officer

Notification of Hazardous Waste Site

Side Two

Waste Quantity:

Place an X in the appropriate boxes to indicate the facility types found at the site

In the "total facility waste amount" space give the estimated combined quantity (volume) of hazardous wastes at the site using cubic feet or gallons.

In the "total facility area" space, give the estimated area size which the facilities occupy using square feet or acres.

Facility Type

1. ☐ Piles
2. ☐ Land Treatment
3. ☒ Landfill
4. ☐ Tanks
5. ☐ Impoundment
6. ☐ Underground Injection
7. ☐ Drums, Above Ground
8. ☐ Drums, Below Ground
9. ☐ Other (Specify)

Total Facility Waste Amount

cubic feet unknown

gallons unknown

Total Facility Area

square feet unknown

acres See Item I

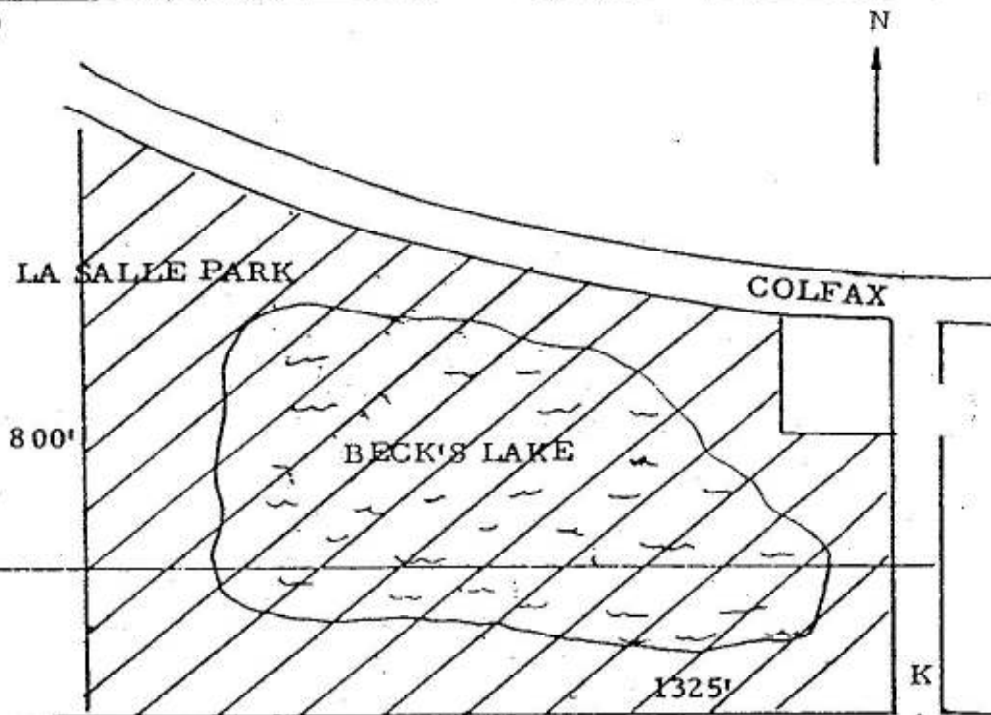
Known, Suspected or Likely Releases to the Environment:

Place an X in the appropriate boxes to indicate any known, suspected, Unknown ☐ Known ☐ Suspected ☐ Likely ☐ None or likely releases of wastes to the environment.

Note: Items Hand I are optional. Completing these items will assist EPA and State and local governments in locating and assessing hazardous waste sites. Although completing the items is not required, you are encouraged to do so.

H Sketch Map of Site Location: (Optional)

Sketch a map showing streets, highways, routes or other prominent landmarks near the site. Place an X on the map to indicate the site location. Draw an arrow showing the direction north. You may substitute a publishing map showing the site location.



I Description of Site: (Optional)

Describe the history and present conditions of the site. Give directions to the site and describe any nearby wells, springs, lakes, or housing. Include such information as how waste was disposed and where the waste came from. Provide any other information or comments which may help describe the site conditions.

- Site at some point within an area of approximately 15 acres.
- Site owned by the City of South Bend.
- Site area served by City Water System.

D	C	L	B	K
U	A	I	E	A
N	M	B	N	L
D	D	E	D	E
E	E	R	I	E
	N	T	X	Y

J Signature and Title:

The person or authorized representative (such as plant managers, superintendents, trustees or attorneys) of persons required to notify must sign the form and provide a mailing address (if different than address in item A). For other persons providing notification, the signature is optional. Check the boxes which best describe the relationship to the site of the person required to notify. If you are not required to notify check "Other".

Name THE BENDIX CORPORATION
 Street 401 Bendix Drive (P.O. Box 4001)
 City South Bend State IN Zip Code 46620
 Signature Gerald J. Budzin Date March 28, 1984
 Manager of Environmental Control

- ☐ Owner, Present
- ☐ Owner, Past
- ☒ Transporter
- ☐ Operator, Present
- ☐ Operator, Past
- ☐ Other

EPA Notification of Hazardous Waste Site

United States
Environmental Protection
Agency
Washington DC 20460

This initial notification information is required by Section 103(c) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 and must be mailed by June 9, 1981.

Please type or print in ink. If you need additional space, use separate sheets of paper. Indicate the letter of the item which applies.

Site 15

A Person Required to Notify:

Enter the name and address of the person or organization required to notify.

Name THE BENDIX CORPORATION
Street 401 Bendix Drive (P.O. Box 4001)
City South Bend State IN Zip Code 46620

B Site Location:

Enter the common name (if known) and actual location of the site.

Name of Site "Beck's Lake Site"
Street Colfax and Kaley Streets
City South Bend County St. Joseph State IN Zip Code 46619

C Person to Contact:

Enter the name, title (if applicable), and business telephone number of the person to contact regarding information submitted on this form.

Name (Last, First and Title) Budzin, Gerald J. - Manager of Environmental Control
Phone (219) 237-5993

D Dates of Waste Handling:

Enter the years that you estimate waste treatment, storage, or disposal began and ended at the site.

Used until mid 1950's.
From (Year) To (Year)

E Waste Type: Choose the option you prefer to complete

Option 1: Select general waste types and source categories. If you do not know the general waste types or sources, you are encouraged to describe the site in Item I—Description of Site.

General Type of Waste:

Place an X in the appropriate boxes. The categories listed overlap. Check each applicable category.

May have included:

1. ☒ Organics
2. ☒ Inorganics
3. ☒ Solvents
4. ☐ Pesticides
5. ☒ Heavy metals
6. ☒ Acids
7. ☒ Bases
8. ☐ PCBs
9. ☐ Mixed Municipal Waste
10. ☐ Unknown
11. ☒ Other (Specify)
Asbestos

Source of Waste:

Place an X in the appropriate boxes.

1. ☐ Mining
2. ☐ Construction
3. ☐ Textiles
4. ☐ Fertilizer
5. ☐ Paper/Printing
6. ☐ Leather Tanning
7. ☐ Iron/Steel Foundry
8. ☐ Chemical, General
9. ☒ Plating/Polishing
10. ☐ Military/Ammunition
11. ☐ Electrical Conductors
12. ☐ Transformers
13. ☐ Utility Companies
14. ☐ Sanitary/Refuse
15. ☐ Photofinish
16. ☐ Lab/Hospital
17. ☐ Unknown
18. ☒ Other (Specify)
Automotive/Aerospace
Manufacturing Facility
SIC Code 3714, 3722 &

Option 2: This option is available to persons familiar with the Resource Conservation and Recovery Act (RCRA) Section 3001 regulations (40 CFR Part 261).

Specific Type of Waste:

EPA has assigned a four-digit number to each hazardous waste listed in the regulations under Section 3001 of RCRA. Enter the appropriate four-digit number in the boxes provided. A copy of the list of hazardous wastes and codes can be obtained by contacting the EPA Region serving the State in which the site is located.

Bendix Corporation
South Bend, Indiana

Waste streams as suggested from Division of Land Pollution Control files and waste hauler reports. (Quantities are based on 1979-1980 reports.)

Asbestos containing fire brick
Paint Wastes (VM + P Naptha, aliphatic hydrocarbon solvent, Methyl Isobutyl Ketone, Ethanol and Mineral Spirits)

Tie Bar Wastes
M.O.C.A. contaminated wastes (4,4-Methylene bis 2-Chloroaniline)
Raw M.O.C.A wastes (approximately 30 gal/yr)
Asbestos dust
Asbestos pellets
Asbestos
Soluble Oil and Water Mixture (approximately 10,000 gal/mo)
Hydroxide Sludge
Chromium Spray Booth Paint Wastes
Touch-up Paint Wastes
Salt Bath Salts (Chloride salts?)
Chromic Acid
Zinc Hydroxide/Calcium phosphate sludge
Lead Hydroxide/Lead sulfide sludge
Wastewater treatment sludge (approximately 300 tons/yr)
Iron/Zinc phosphate sludge
Heat Treating Salts
Chromic Acid contaminated fiberglass pit liner
Chromic anodic tank clean-out
Chrome plating tape
Nickel waste
T-Line cleanout
Stoddard Solvents
Foundry Sand (see below for analysis)
Cadmium hydroxide sludge
Ferro Cyanide and Cyanide wastes
Naphtha

Bendix Corporation makes brakes, steering systems, brake components and streets for automobiles and airplanes. They notified on 17 sites, including their plant at 401 Bendix Drive, South Bend, Indiana. The other 16 properties are off-site and under private ownership. The site names, dates, and addresses are:

St. Joseph County Landfill, Jackson and Locust Roads, 1940-70
St. Joseph County Landfill, U.S. 31 and Ireland, 1969-1971
Dollar Lake Site, SR 23 and Mayflower Road, Early to mid 1960's
Area West of Bendix Oil Tank, Linden Avenue, 1940-1970
Beck's Lake Site, Colfax and Kaley Streets, until mid 1950's
Butternut Road Site, Butternut and Douglas Roads, 6 months in 1955-1960

Former City/County Landfill, Bendix Drive North of Lincolnway West, until early 1960's
Fillmore Road North Site, Fillmore Road West of Mayflower, 1 to 1 1/2 years in mid 1950's
Douglas Road Site, Douglas and Bendix Drive, 1960s to closure
Linden Road Site, Linden and Chippewa Roads, 30 days, 1970's
Pine Road Site, Pine and Fillmore Roads, mid 1960's
Sample Street Lagoon Site, 3300 West Sample Street, 1956-1972
Speeks Site, Bendix Drive and Douglas Road, mid 1960's thru early 1970's
South Bend Avenue Site, South Bend and Twy Kenham Avenue, unknown
Schuman Dump Site, Mayflower and Ireland Road, 1960-1970
Western Avenue Site, Elmer, Huron, Hollywood and Ford, unknown
All St. Joseph County-All South Bend

The Bendix Corporation has operated from approximately 1930 to the present time, although off-site disposal was halted sometime around 1973. The disposal dates are approximate in most cases and represent a "best effort" by the company prior to their filing in March of 1984.

Foundry Sand, (in ppm)
phenols, 1.2-to-4.6
Naphthalene, .460-to-2.400
Phenanthrene, .2
Zinc, .43-38
Selenium, .08
Methylene Chloride, .012-to-9.2
TCE, .039
1,1,2,2-Tetrachlorethylene, .016
Butylbenzylphalate, .6-to-.270
Arsenic, 17
Cadmium, 1.0-to-.01
Copper, 12
Lead, 14
Chromium, 6.7
Nickel, 3.4
Manganese, .053
Bis (2-ethylhexyl) phthalate, .680-to-.220
Toluene, .057
Pentachlorophenol, .520
1,3-Isobenzofurandione, 310

These numbers show some ranges resulting from many samplings at various dates. Note that cyanides, sulfates and chlorides were not run on these samples.

SB/sk

1976 Bendix Liquid Waste Removal Record

201,600 gallons emulsion
60,070 gallons Trichlorethylene (TCE) sludge
10,000 gallons Sodium Dichromate Waste
3,300 gallons Laquer Thinner Waste
1,500 gallons Copper Cyanide Stripper Waste
15,200 gallons Chromic Acid Waste
715 gallons Copper, Nickel and Cyanide Waste
825 gallons Cadmium Cyanide Waste
605 gallons methylene chloride
214,000 pounds Triad Sludge (unknown components)
33,225 gallons cyanide
1,045 gallons methyl chloroform
220 gallons Perchlorethylene
3 Transformers
3 Capacitors
1,265 gallons PCB oil
550 gallons PCB sludge
1,040 cubic yards/yr foundry sand (*see analysis other page in packet)

This is a tally of Bendix Corporation Liquid Waste Hauler reports for the year of 1976 to get an idea of wastes disposed of. This could be considered to be a representative sampling of the waste haulers reports and indicative of wastes possibly disposed of prior to 1973 or 1974 when their disposal practices were revised. Since many of the sites Bendix notified on fall into the period prior to 1973-4, this is a means to look at quantities and types of wastes possibly disposed of into off-site private and city/county facilities.

SB/sk